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Scientific Article

Oncology Trainee Perceptions of the Prior Authorization Process: A National Survey

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Abstract

Purpose: The medical trainee perspective regarding the prior authorization process has not been previously assessed. Here we evaluate the perceptions of radiation and medical oncology trainees regarding the prior authorization process and its effect on their training and patient care.

Methods and Materials: A 12-question, nonincentivized, electronic national survey of radiation and medical oncology trainees at all Accreditation Council for Graduate Medical Education accredited oncology programs was conducted. Participation, perspectives, and experiences with the prior authorization process were assessed by Likert scale, free response, and multiple response selection.

Results: Between January and March of 2019, the survey was distributed to 1505 trainees at 76 institutions with responses from 174/616 radiation (28.2%) and 139/889 medical oncology trainees (15.6%). The majority (69.2%) reported participating in the prior authorization process (radiation: 78.2% vs medical: 57.6%; $P < .01$). Most trainees (71%) reported concern for decline in the quality of patient care due to the prior authorization process. The majority of trainees (77.1%) reported decreased enthusiasm for work and choice of profession, with a higher incidence in medical oncology trainees (83.1% vs 73.7%, $P = .04$). The most commonly recommended modifications by trainees included that the insurance reviewer be in the same specialty as the ordering provider (87.7%), providers be compensated for participation (82.7%), and turnaround time be more rapid (74.3%).

Conclusions: These data indicate that trainees in US oncology programs are active participants in the prior authorization process and report that prior authorization approvals negatively influence their medical training and the quality of patient care. Additional efforts to revise the insurance approval process are warranted.

Introduction

Health care spending in the United States is projected to grow at a rate of 6% annually and by 2026 will constitute 19.7% of the annual gross domestic product.[1] To stem these rising costs and improve profitability, insurance companies have implemented the prior authorization process, which requires providers to obtain preapproval for certain services rendered to qualify for payment.[2]

Data sharing statement: Research data are stored in an institutional repository and will be shared upon request to the corresponding author.

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However, physicians have increasingly expressed concerns surrounding the prior authorization process as highlighted in the 2017 and 2018 American Medical Association surveys, in which providers criticized prior authorizations as being inefficient and negatively affecting patient outcomes.[3]

More recently, reports have highlighted instances in which prior authorizations have been inadequately reviewed within the context of novel therapies that may be available for treatment.[4] These reports are particularly troubling for the field of oncology, wherein the standard of care changes frequently due to advances in imaging, systemic therapies, and radiation therapy, all of which are subject to the prior authorization process. Though the perception of the prior authorization process has been largely negative among oncologists, its effect on oncology trainees, their education, and their attitudes is unknown. Given the recent emphasis in reducing house staff work hours, it is critical that their responsibilities prioritize activities that are educational and provide training for independent practice.[5] The aim of this study was to evaluate the perceptions of residents and/or fellows in radiation oncology and medical oncology regarding the prior authorization process, and to determine how it has affected their training and the care they provide for patients.

Methods and Materials

In January 2019, a 12-question electronic survey was distributed via email invitation to radiation oncology residents in all Accreditation Council for Graduate Medical Education (ACGME)—accredited programs and to medical oncology fellows at the corresponding institutions. Questions assessed trainee participation in prior authorization, trainee impressions on the prior authorization process, suggestions for prior authorization process improvement, and participant demographics. Survey questions were written by an attending physician and 2 resident physicians and are available for review in Table 1. This study was deemed exempt by our institutional review board.

Anonymous, nonincentivized, and voluntary surveys were distributed via SurveyMonkey.com. The goal response rate was 20% with plans to send 2 reminder emails at 2-week intervals and close the survey 2 weeks after the final reminder. This response rate was selected as survey response was anticipated to be less than that of society-endorsed surveys due to high demand on trainee time and survey fatigue.[6,7] Whereas the merit and potential for impact of investigator initiated surveys are largely unknown, societal surveys appear to have the support of the society's leadership and potential to drive change in a given organization. Descriptive statistics, tests of proportions, and the Fisher exact test were used for statistical analysis. A 2-sided $P < .05$ was considered statistically significant.

Results

The survey was distributed to 1505 trainees at 76 institutions, with 313 individual responders, including 174 of 616 radiation oncology trainees and 139 of 889 medical oncology trainees (28.2% vs 15.6%, $P < .01$). Questions and responses from the survey are provided in Table 1.

Most respondents (69%) reported participating in prior authorizations, though rates differed by radiation oncology and medical oncology specialties (78.2% vs 57.6%, $P < .01$). Frequency of prior authorizations was also higher among radiation oncology trainees, with 58% reporting >2 appeals per month compared with 29.4% of medical oncology trainees ($P < .01$). A significant portion of trainees spend more than 30 minutes on each appeal (40%). In regard to the peer-to-peer process, 55% of trainees indicated that the reviewing physician did not have proper credentials to accurately assess the clinical scenario when denying the claim. Though most respondents (71.7%) reported successful appeals >50% of the time, 74.6% of trainees stated that issues with prior authorizations would lead to changes in the recommended treatment "sometimes" or "often," which was similar by specialty (radiation oncology: 74.4% vs medical oncology: 75.0%, $P = .99$).

Trainees shared concerns regarding the effects of prior authorization on patient care, with nearly all (92.4%) stating that prior authorizations "increased the time it takes for patients to receive care." Accordingly, 75.6% of trainees reported "somewhat" or "strongly" decreased enthusiasm for work and choice of profession, though this sentiment was more common among medical oncology trainees compared with radiation oncology trainees (83.1% vs 73.7%, $P = .04$). As many as 67% of trainees reported that the prior authorization process negatively affected their clinical training and education. The most commonly recommended modification by trainees included the suggestion that the insurance reviewer be in the same specialty as the ordering provider (87.7%). This was followed by recommending that providers be compensated for the prior authorization process (82%), the peer reviewer have more appropriate medical credentials (69%), and the prior authorization process be more timely (74%).

Discussion

This is the first study to assess oncology trainee perspective on the prior authorization process. We found that a high percentage of trainees are involved in the prior authorization and peer-to-peer process but report that it negatively affects their clinical education and training as well as their enthusiasm for their chosen profession. Given the limited time during training to learning clinical and research skills, especially in an era of reduced duty

Table 1 Survey questions and responses

	Medical oncology n = 139					Radiation oncology n = 174					Total N = 313				
1. Do you conduct or participate in appeals and peer-to-peer reviews for insurance denial of medications, imaging, or procedures you or your team prescribed?	Yes			No		Yes			No		Yes			No	
	80 (57%)			59 (42%)		136 (78%)			38 (22%)		216 (69%)			97 (31%)	
2. How often do you participate in the appeals process with insurance companies, either by paper or phone? (times per mo)	1-2	3-5	6-10	>10		1-2	3-5	6-10	>10		1-2	3-5	6-10	>10	
	54 (71%)	13 (17%)	9 (12%)	0		57 (44%)	44 (34%)	23 (18%)	5 (4%)		111 (54%)	57 (28%)	32 (16%)	5 (2%)	
3. On average, how much time do you spend on each appeals process (including preparation time, written appeals, and peer-to-peer reviews)? (min)	<5	5-14	15-29	≥30		<5	5-14	15-29	≥30		<5	5-14	15-29	≥30	
	2 (3%)	15 (20%)	27 (36%)	32 (43%)		1 (1%)	37 (29%)	42 (33%)	49 (38%)		3 (1%)	52 (25%)	69 (34%)	81 (40%)	
4. How often do you overturn insurance denials with appeals? (percent)	<25	25-49	50-75	>75		<25	25-49	50-75	>75		<25	25-49	50-75	>75	
	6 (8%)	19 (25%)	31 (41%)	20 (26%)		13 (10%)	20 (16%)	48 (37%)	48 (37%)		19 (9%)	39 (19%)	79 (39%)	68 (33%)	
5. The physician I speak to during peer-to-peer reviews has appropriate qualifications to decline or approve the treatment, imaging, or laboratory testing in question.*	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2
	0	9 (12%)	23 (30%)	26 (34%)	18 (24%)	1 (1%)	25 (19%)	33 (26%)	44 (24%)	26 (20%)	1 (0%)	34 (17%)	56 (27%)	70 (34%)	44 (21%)
6. How often do issues with the appeals process lead to changing the recommended course of treatment?†	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2
	0	16 (21%)	41 (54%)	13 (17%)	6 (8%)	0	23 (18%)	73 (57%)	29 (22%)	4 (3%)	0	39 (19%)	114 (56%)	42 (20%)	10 (5%)
8. The peer-to-peer process has changed the enthusiasm I feel about my work and choice of profession in the following ways:‡	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2
	0	0	13 (18%)	37 (51%)	23 (32%)	0	0	35 (28%)	66 (53%)	23 (19%)	0	0	48 (24%)	103 (52%)	46 (23%)
10. The time and effort preparing for and performing appeals and peer-to-peer reviews (ie, reviewing pertinent literature, discussing case with attending physician) have the following impact on my clinical education and training.§	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2	+ 2	+ 1	0	−1	−2
	1 (1%)	7 (10%)	18 (25%)	24 (33%)	23 (32%)	1 (1%)	18 (15%)	20 (16%)	55 (44%)	30 (24%)	2 (1%)	25 (13%)	38 (19%)	79 (40%)	53 (27%)
7. In your opinion, how has the appeals and peer-to-peer process changed the following regarding patient care (check all that apply)? (total only)	Quality of care					Cost of care					Time to receive care				
	Decreased		Increased			Decreased		Increased			Decreased		Increased		
	141 (72%)		4 (2%)			30 (15%)		64 (32%)			4 (2%)		182 (92%)		
	Frequency of appropriate care														
	Decreased		Increased												
	113 (57%)		6 (3%)												
9. What modification(s) would you make to the current insurance appeal system, if any (check all that apply)? (total only)	None			Same specialty reviewer		Compensation for prior authorization			Increased credentials for peer-to-peer		More rapid decisions				
	0			170 (86%)		163 (82%)			135 (69%)		146 (74%)				
11. What is your level of training?	PGY-0031		PGY-2	PGY-3		PGY-4			PGY-5		PGY-6		Other		
	1 (1%)		13 (7%)	32 (16%)		61 (31%)			58 (29%)		30 (15%)		2 (1%)		
12. In what region of the United States do you train?	Northeast			South		Midwest					West				
	75 (38%)			41 (21%)		56 (28%)					25 (13%)				

Abbreviation: PGY = postgraduate year.

* Strongly agree (+ 2), somewhat agree (+ 1), neutral (0), somewhat disagree (−1), strongly disagree (−2).

† Always (+ 2), often (+ 1), sometimes (0), rarely (−1), never (−2).

‡ Strongly increased (+ 2), somewhat increased (+ 1), neutral (0), somewhat decreased (−1), strongly decreased (−2).

§ Strongly contribute/improve (+ 2), somewhat contribute/improve (+ 1), neutral (0), somewhat detract/prevent (−1), strongly detract/prevent (−2).

hours, this is concerning. Although not specifically assessed in this survey, this negative impact on education and enthusiasm may be associated with an increase in trainee burnout as well.[8,9]

The ACGME has long maintained that trainees actively participate in all aspects of patient care.[10] As practicing physicians are ultimately responsible for prescribing and directing a patient's care, the ability to navigate billing and prior authorization hurdles is critical to a physician's clinical acumen. This is perhaps one of many reasons trainees have participated in the prior authorization process. In our study, we found that trainees in both radiation and medical oncology are actively involved in the prior authorization process, with 69% reporting participation and 82% of this participating group completing 1 to 5 appeals per month. Importantly, these efforts are perceived by trainees as decreasing the quality of patient care (72%) and frequency with which appropriate care is delivered (57%). Although the majority of respondents (72%) reported successful appeals >50% of the time, 19% of respondents reported that issues with the prior authorization process will "often" change the intended treatment course.

In both the American Medical Association survey and this survey, 92% of participants reported prior authorization-associated delays in patient care.[3] This finding is in line with published data that prior authorizations delayed initiation of radiation therapy by an average of 3 weeks in patients recommended to undergo proton beam therapy.[11] A similar study found that as many as 34% of such patients are initially denied proton treatment,[12] which suggests that the prior authorization process disproportionately affects innovative treatment modalities. This is also observed in the field of medical oncology, where a study evaluating prior authorizations in a high-volume breast-oncology clinic found that 26.5% of all prior authorizations tracked were for palbociclib,[13] a novel therapy for hormone-sensitive breast cancers. Prior authorization denials for these services are likely a major reason why trainees report changes in the recommended treatment plan for these patients up to 75% of the time. This is especially significant because treatment delays have been associated poorer outcomes in multiple cancer types.[14-16] Further, the efforts of trainees and physicians to perform the prior authorization process are not tracked, credited, or financially reimbursed. This also includes the efforts of dosimetrists and physicists to produce comparison plans for insurance companies to demonstrate the need for more complex radiation techniques.

Trainees do identify several possible avenues for improving the prior authorization process. In this survey, nearly 90% of participants suggested that that insurance reviewers be in the same specialty as the ordering provider, and 75% supported more rapid turnaround times. Physician compensation for time and effort spent on the prior authorization process may disincentivize insurance companies from denying claims based on algorithms or the decision making of physicians who lack training in the relevant field. Oversight to ensure that this compensation is not abused would be required.

Cancer care is generally categorized as nonemergent by insurance companies, with company policy permitting up to weeks for appeal decisions after peer-to-peer discussion, and potentially no option for further discussion during this arbitration period. In a patient population where certain diagnoses can result in a life expectancy of less than a year, up to 10% of that remaining time could potentially be spent waiting for approval to pursue life-extending or life-saving therapies. This can result in high patient and physician concern and selection of less ideal treatments that are approved by insurance providers.

The prior authorization issue is not unique to oncology. Published data indicate it hinders delivery of patient care in psychiatry,[17] dermatology,[18] endocrinology,[19] and gastroenterology,[20] to cite a few examples. Changes are necessary so that the decision making of trained medical professionals is not governed by reimbursement guidelines that are not infrequently written and executed by those without pertinent medical expertise. One potential solution would be transitioning authority to regulate inappropriate medical practice (ie, excessive diagnostics and procedures) from insurance providers to the medical boards that grant licensure to their practicing members. The standing policy would be that all orders are covered by the insurance provider. If the reimbursing body has concerns for inappropriate practice, it can file a complaint to the physician licensing board. Patient diagnostic study and treatment orders would not be affected until a final finding of inappropriate use was determined. This would allow a system where medical practice was reviewed by credentialing physician bodies, not insurance policy rubrics, without delaying patient care. The American Society of Clinical Oncology Value Framework is an important example of oncology leadership helping physicians exercise cost conscientious, patient-specific care.[21] However, in our current environment, the ultimate arbitrator of care delivered still remains the reimbursing entity.

The response rate of this study, while limited, is not too far from previously published studies assessing medical house staff and oncologists.[6,7,22] Given the multiple demands on time that medical trainees face, responding to surveys may not be frequently prioritized. Recent data demonstrate that surveys with lower response rates may be as accurate or more accurate compared with those with higher response rates.[23] It is true that these findings may be biased toward a cohort of trainees who have the most extreme experiences with the prior authorization process. However, it is possible that this is truly an evenly distributed response group and that frequent email reminders may have negatively influenced the quality of the data.[24,25] Further, the authors propose that similar concerns voiced in 20% of a residency program via an ACGME residency evaluation survey would likely result

in immediate department and program director response. Because the responses were anonymous, it was not possible to link rate of participation in prior authorization to specific technology such as proton therapy or adaptive radiation therapy. We anticipate that centers with treatment modalities that are considered experimental in certain disease settings would undergo more frequent prior authorization processes. While these data may be limited to a hypothesis generating study, they identify a potential area of improvement as program directors work to address oncology program education and quality of life issues.

Conclusion

The authors recognize that meaningful reform to the prior authorization process will take time. Despite its challenges, prior authorization remains an integral component of the health care system. Until significant reform is achieved, trainees should maintain active participation because it is an integral component of patient care and it is highly likely that they will also engage in the prior authorization process as practicing physicians. Program directors may meet with trainees to discuss novel approaches to the prior authorization process to increase appeal success rate and decrease time allotted to each appeal (eg, shared templates for appeal letters, discussing data with faculty before peer-to-peer call, and reviewing provider approval criteria for service specific diagnoses and treatments). In the meantime, we urge clinical and academic societies to advocate for tangible reform so that this process does not negatively affect medical education and clinical training.

Declaration of Competing Interest

None.

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